

Before the
FEDERAL COMMUNICATIONS COMMISSION
 Washington, D.C. 20554

_____)
 Petition for Declaratory Ruling)
 and Rulemaking With Respect to)
 Defining, Predicting and Measuring)
 "Grade B Intensity" for Purposes)
 of the Satellite Home Viewer Act)
 _____)

RECEIVED
 SEP 25 1998
 No. RM-9345 FEDERAL COMMUNICATIONS COMMISSION
 OFFICE OF THE SECRETARY

**OPPOSITION TO PETITION FOR DECLARATORY RULING
 AND/OR RULEMAKING OF ECHOSTAR COMMUNICATIONS CORPORATION**

A.H. Belo Corporation ("Belo"),¹ by its attorneys, hereby opposes the above-referenced "Petition for Declaratory Ruling and/or Rulemaking" ("*Petition*"). EchoStar's *Petition* seeks to have the Commission nullify the Congressionally-imposed limits on the scope of the compulsory copyright license for DBS retransmission of network signals created by the Satellite Home Viewer Act of 1988 ("SHVA"), Pub. L. No. 100-667 §202, 102 Stat. 3949 (1988), *codified as amended at* 17 U.S.C. § 119 (1994 & Supp. 1997), and therefore should be rejected.

1. Introduction and Summary

Among DBS providers, EchoStar consistently has been one of the most vocal proponents of expansion of the DBS copyright license, pushing the envelope at every opportunity to eliminate legal restrictions that it finds objectionable and inconvenient.² Although EchoStar and

¹ Belo is licensee of 17 television stations located in 14 states.

² See, e.g., *Video Competitors*, 6 Warren's Cable Regulation Monitor No. 14, 1998 WL 10725948 (April 6, 1998) (reporting that EchoStar petitioned the Copyright Office to redefine the "unserved households" term in the SHVA, then petitioned the Federal Trade Commission to intervene in the Copyright Office proceeding on its behalf).

other DBS providers have been hard at work seeking legislation to relax these restrictions, they are not content to await Congressional action. Thus, the instant *Petition* is yet another attempt by EchoStar to alter a statutory scheme by circumventing the legislative process in which the matter is most properly addressed.

EchoStar's proposal would involve the Commission in much more than making minor administrative adjustments to a standard incorporated in the statute; the *Petition* is an obvious attempt to use the Commission in an "end run" around the Congress. What is more, by casting its request as an emergency measure, EchoStar would have the FCC take this unprecedented and unwise step in a precipitous manner. Ironically, as will be shown below, EchoStar itself is one of the prime contributors to the situation that the *Petition* cites as the justification for expedited Commission consideration.

EchoStar's proposal has many serious flaws; foremost among them is its utter inconsistency with the SHVA itself. In assessing EchoStar's request, the Commission also must keep two additional factors in mind: (1) that the plight of consumers which EchoStar's proposal is intended to rectify is largely the result of DBS providers' own misleading marketing practices and their widespread evasion of a statutory provision they find objectionable; and (2) that Congressional efforts to fashion an effective means for DBS subscribers to receive network

signals (“local-into-local”) are well underway, making the need for an FCC “bail-out” of DBS providers even less advisable or necessary.³

1. EchoStar Seeks To Have The Commission Adopt Definitions of “Unserved Household” and “Grade B Intensity” That Contradict the Text, Legislative History, Structure and Purpose of the SHVA

The SHVA prohibits a satellite carrier from retransmitting a network signal to any household that is not an “unserved household.” 17 U.S.C. §§ 119(a)(2), (a)(5). “The term ‘unserved household’, with respect to a particular television network, means [*inter alia*] a household that cannot receive, through the use of a conventional outdoor rooftop receiving antenna, an over-the-air signal of grade B intensity (as defined by the Federal Communications Commission) of a primary network station affiliated with that network. . . .” 17 U.S.C. § 119(d)(10)(A).

Although the meanings of the terms “unserved household” and “Grade B intensity” have been settled and understood for years, EchoStar now urges the Commission to adopt new and radically different definitions of these terms for purposes of the SHVA alone. Under EchoStar’s proposal, “unserved” would now mean “served,” and “Grade B intensity” would now mean “Grade A (or even stronger) intensity.” The effect of these radical changes would be severe: under EchoStar’s definition, the majority of American households currently are “unserved” by an over-the-air broadcast television signal.

³ In addition, EchoStar’s proposal is objectionable because it asks the Commission to assume a role that goes far beyond what is proper, appropriate or advisable for a regulatory agency. In its opposition to a similar petition filed by the National Rural Telecommunications Cooperative (“NRTC”), the National Association of Broadcasters (“NAB”) pointed out serious legal questions as to the FCC’s jurisdiction to, in effect, amend an Act of Congress. Nevertheless, that is precisely what the EchoStar petition seeks to have the Commission do. Belo concurs in the NAB’s comments, but will not repeat its arguments here.

Maps contained in Exhibit 1 hereto compare the Grade B coverage areas of three Belo stations in different parts of the country, as calculated using a traditional FCC formulation, to the stations' respective coverage areas using the methodology EchoStar is proposing. Each station's coverage area is reduced dramatically. Moreover, for two stations, entire counties that currently are considered "served" by the station—and for which substantial off-air viewership is demonstrated through recent Nielsen reports—would become "unserved" under EchoStar's proposal. For all three of the stations in question, the change is so fundamental that it would effectively eviscerate the restrictions Congress imposed on the DBS retransmission license. And there is every reason to expect similar results if the same comparison were done for other stations. Because Congress neither intended nor enacted these sweeping changes, the Commission should reject EchoStar's attempt to circumvent the statutory restrictions imposed on retransmission of network signals by the SHVA.

To discover the "plain meaning" of a statute, the Commission should employ the "traditional tools of statutory construction . . . includ[ing] examination of the statute's text, legislative history, and structure, as well as its purpose to determine whether Congress has spoken to the precise question at issue." *Bell Atlantic Tel. Cos. v. FCC*, 131 F.3d 1044, 1046 (D.C. Cir. 1997) (citing *Southern California Edison Co. v. FERC*, 116 F.3d 507, 515 (D.C. Cir. 1997); *First Nat'l Bank & Trust v. National Credit Union*, 90 F.3d 525, 529-30 (D.C. Cir. 1996), *aff'd*, 118 S. Ct. 927 (1998); *National Resources Defense Council, Inc. v. Browner*, 57 F.3d 1122, 1125 (D.C. Cir. 1995)). If this search yields a clear result, then Congress has expressed its intention as to the question, and the agency is bound to implement that intention. *Id.* In the present case, each of these traditional tools of statutory interpretation leads to the conclusion that Congress intended in the SHVA to limit the blanket license for DBS retransmission of network

signals to a relatively narrow universe of households that are unable to receive local network broadcasts over the air.

First, “absent a clearly expressed legislative intention to the contrary, statutory language must ordinarily be regarded as conclusive.” *United States v. Wells*, 117 S. Ct. 921, 930 (1997) (quoting *Consumer Product Safety Comm’n v. GTE Sylvania, Inc.*, 447 U.S. 102, 108 (1980)) (brackets omitted). Therefore, the Commission should begin its inquiry by assuming that the term “unserved” means the same thing in the SHVA that it means in ordinary parlance, *i.e.* that a household is “unserved” if it essentially receives *no* service. Based on the Act’s plain language, Congress never intended that “unserved” households, located principally in remote, so-called “white areas,” would encompass a majority of the television households in the United States.

In addition, it must be recognized that as a structural matter, the SHVA was enacted not as part of the Communications Act, but rather as part of the Copyright Act. Thus, the SHVA must be interpreted in light of the policies and purposes of the Copyright Act.⁴ It is a fundamental premise of copyright policy that compulsory licenses—such as the DBS retransmission license mandated by the SHVA—are to be construed narrowly. *See, e.g. Fame Publishing Co. v. Alabama Custom Tape, Inc.*, 507 F.2d 667, 670 (5th Cir.), *cert. denied*, 423 U.S. 841 (1975) (Because a “compulsory license provision is a limited exception to the copyright holder’s exclusive right to decide who shall make use of his [copyrighted material], . . . it must be construed narrowly, lest the exception destroy, rather than prove, the rule.”). This principle

⁴ *See Kokoszka v. Belford*, 417 U.S. 642, 650 (1974) (“When interpreting a statute, the court will not look merely to a particular clause in which general words may be used, but will take in connection with it the whole statute . . . and the objects and policy of the law, as indicated by its various provisions, and give to it such a construction as will carry into execution the will of the Legislature.”) (internal quote marks omitted).

obtains because compulsory licenses deny copyright holders their normal legal rights to control the use of their work and to negotiate compensation with the copyright users. Therefore, the scope of a compulsory license provision should neither be expanded beyond what Congress intended, nor interpreted in such a way as to frustrate the purposes of the copyright law. *Id.*

In creating a compulsory license for limited DBS retransmission of network signals under the SHVA, consistent with the general principles of copyright law, Congress sought to limit the application of this compulsory license to a relatively narrow universe of households that are unable to receive local network broadcasts over the air. Thus, when Congress generally prohibited satellite carriers from making secondary transmissions of primary network station transmissions, it did not expect or intend that the limited “white area” exception to its general prohibition would swallow the rule.⁵ Rather, in keeping with fundamental copyright policy, Congress looked to traditional FCC signal intensity standards to identify the limited group of households for which a statutory copyright license was necessary in order to enable them to receive network programming.

Thus, two separate House Committee Reports pertaining to the 1988 SHVA expressly state that the “white area exception” was enacted “in recognition of the fact that *a small percentage of television households* cannot now receive clear signals embodying the programming of the three national television networks.” House Judiciary Committee Report, H.R. Rep. No. 100-887, pt. 1, at 18 (emphasis added), *reprinted in* 1988 U.S.C.C.A.N. 5611,

⁵ See *Edward B. Marks Music Corp. v. Colorado Magnetics, Inc.*, 497 F.2d 285, 288 (10th Cir. 1974), *cert. denied*, 419 U.S. 1120 (1975) (“a proviso or exception to [a] statute vesting a copyright interest . . . should be strictly construed to the end that an exception does not devour the general policy which a law may embody.”) (citing *Shilkret v. Musicraft Records, Inc.*, 131 F.2d 929 (2d Cir. 1942), *cert. denied*, 319 U.S. 742 (1943)).

5621; *accord* House Energy and Commerce Committee Report, H.R. Rep. No. 100-887, pt. 2, at 19 (1988) (emphasis added), *reprinted in* 1988 U.S.C.C.A.N. 5638, 5648. Further, the House Energy and Commerce Committee expressly characterized these unserved white areas as “typically rural.” *Id.* Congress repeated this characterization in enacting the Satellite Home Viewer Act of 1994 [the “1994 SHVA”], Pub. L. No. 103-369 § 2, 108 Stat. 3477 (1994). At that time, the Senate Judiciary Committee reported that it:

is especially aware of the importance of home satellite viewing to households in *rural areas*. For many of them, satellite is their only ‘window on the world’ and their only source of popular news, sports, and entertainment programming that cable households and those who receive broadcast signals off-the-air take for granted. . . . Making certain that *rural viewers* have access to such programming . . . is an important underlying principle of this legislation. . . .

S. Rep. No. 103-407, at 8 (1994) (emphasis added).

EchoStar’s novel reinterpretation of the meaning of a “Grade B Signal Area” simply cannot be reconciled with Congress’s understanding that Grade B network signals can be received via conventional rooftop antenna by all but a small percentage of television households that are “far from the big cities” and “typically rural.” Moreover, contrary to EchoStar’s assertions, Congress intended only to insure acceptable reception, *not* to guarantee every TV viewer in America, using every type and quality of equipment, a perfect, crystal-clear picture. The typical coverage patterns of over-the-air television stations were well-known to the drafters of the SHVA, and they chose to rely on the FCC’s Grade B standard as an objective test for distinguishing “served” households that are *not* covered by the license, from “unserved” households, for which the copyright license is available.

2. Adoption Of The Proposal Would Reward Carriers For Disregarding The Law.

It is important for the Commission to recognize that EchoStar is approaching the Commission for this extraordinary relief with less than clean hands. The Grade B intensity standard has been in the SHVA since 1988, yet EchoStar only recently brought what it considers to be the standards' serious shortcomings to the Commission's attention. Perhaps it was unnecessary for EchoStar to do so as long as it seemed possible for carriers to continue hooking up thousands of "served" and ineligible households with impunity. Now that two federal courts finally have stopped the widespread copyright violations,⁶ however, a new tactic apparently is required.

Belo wishes to emphasize that it is not unsympathetic to the plight of DBS subscribers who face the prospect of having their network signals cut off. Accordingly, Belo endorses the broadcasting industry's voluntary postponement of enforcement of the Miami court's injunction against unlawful distribution of CBS and Fox affiliates until January 1, 1999, and supports other efforts to make network signals available via DBS (*see* Section 3, below). At the same time, however, Belo objects strenuously to the attempts of DBS providers to pin the blame for the current situation on local broadcasters. *See, e.g., "Get Involved in the Fight for Freedom of Choice,"* on the EchoStar website, www.dishnetwork.com.

Belo urges the Commission to bear in mind that this unfortunate situation would not have occurred without the misleading marketing practices and disregard for the law by members of the

⁶ *See ABC Inc. v. PrimeTime 24*, -- F. Supp. 2d --, No. Civ. A 1:97CV00090, 1998 WL 544297 (M.D.N.C. Aug. 19, 1998) ("*PrimeTime 24- North Carolina*"); *CBS Inc. v. PrimeTime 24*, -- F. Supp. --, No. 96-3650-CIV, 1998 WL 310683 (S.D. Fla. May 13, 1998) ("*PrimeTime 24 - Miami*").

DBS industry, which have been widely reported in the press and confirmed in the findings of two federal courts.⁷ By acceding to EchoStar's request, the Commission would be establishing the dangerous precedent that agency "bail outs" are available to shield those engaging in illegal activities from the consequences of their acts.

3. Adoption Of The Proposal Is Unnecessary In Light Of Impending Congressional Action To Impose A More Effective Solution.

As a result of recent technological advances, "local-into-local" distribution of network signals affords a more effective, fairer means of incorporating broadcast network programming into the service packages being received by DBS subscribers. To that end, Congress is working on legislation that would amend the SHVA to permit DBS providers to distribute local television signals, including network programming, to their subscribers.⁸ And at the same time, Senate Commerce Committee Chairman McCain (R-Ariz.) and Senate Judiciary Committee Chairman Hatch (R-UT) are also considering bills on satellite broadcasting reform. *Satellite TV*, 20 *Satellite Week* No. 36, at 7, 1998 WL 10711090 (Sept. 7, 1998).

⁷ See, e.g., *PrimeTime 24 - North Carolina*, at *2 (finding that "there was no real dispute that [a DBS provider] had not only committed individual violations by serving ineligible households, but had engaged in a pattern or practice of such violations."); *PrimeTime 24 - Miami*, at *9 (noting that a DBS provider had provided network programming to approximately 35,000 households in a network affiliate's local market after conducting only fourteen signal strength tests in the market, and after finding that the local network affiliate's signal *was* of at least Grade B field strength at nine of the fourteen households; the DBS provider continued to enlist new subscribers without conducting signal strength tests even after the network filed suit; many of these subscribers lived within 7 miles of the affiliate's broadcasting tower).

⁸ On June 24, 1998, the House Commerce Committee reported favorably on H.R. 2921, styled the "Multichannel Video Competition and Consumer Protection Act of 1998." See H.R. Rep. No. 105-661, pt. 1 (1998). An amended version of the same bill, now styled the "Copyright Compulsory License Improvement Act of 1998," was reported favorably by the House Judiciary Committee on August 4, 1998. See H.R. Rep. No. 105-661, pt. 2 (1998). The latter version of the bill has been referred to the Committee of the Whole House on the State of the Union. 144 Cong. Rec. H7583-01 (Sept. 10, 1998).

However, to EchoStar's apparent dissatisfaction, the House bill requires satellite carriers to carry upon request all non-duplicative broadcast signals located within the relevant local market in order to qualify for such a compulsory license. This solution represents the current equilibrium point in a delicate legislative process which must balance the interests of broadcasters, satellite carriers, cable providers, and the public. While it is unclear at the present time exactly where the ultimate balance will be struck, the Commission should refrain from taking any action at this time that would tend to compromise Congress's ultimate ability to craft a solution.

In Belo's view, "local-into-local" would solve the problem of network programming availability and would have the added advantage of making broadcasters' local news and public service programming, including local emergency warnings and information, available to DBS subscribers. In addition, "local-into-local" would preserve the economic integrity of the system of broadcasting that has served the country so well for so many years and would create a truly level playing field among DBS, over-the-air broadcasting and terrestrially based multi-channel video distributors such as cable operators and wireless cable systems. A "local-into-local" approach also would be consistent with the Commission's existing rules applicable to cable TV which are designed to foster a network affiliation system that assumes exclusivity within the source area. *See, e.g.* 47 C.F.R. § 76.92 (1997) (cable system may not carry duplicative non-local network programming upon request of the local affiliate with network non-duplication rights); 47 C.F.R. §§ 76.151, 76.153 (1997) (cable system may not carry duplicative non-local syndicated programming upon request of a program supplier or a local station with exclusive rights).

Belo strongly supports legislation to amend the SHVA to provide for "local-into-local" distribution, with appropriate must-carry and retransmission consent rights for local stations. Indeed, it is only fair that in exchange for their valuable copyright license DBS providers should be willing to accept obligations to which their competing distribution media are subject. Rather than advancing the interests of consumers in the long run, precipitous adoption of EchoStar's proposals could have the unfortunate effect of destroying the momentum building for a legislative effort that promises ultimately to provide a more effective solution.

4. Conclusion

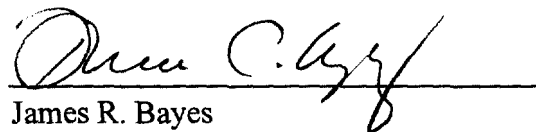
For the reasons set forth above, the Commission should refrain from taking the unprecedented and ill-advised steps EchoStar proposes. While EchoStar attempts to cast its *Petition* as a needed remedy for the plight of ineligible subscribers facing disconnects of their broadcast network service, the proposal in fact serves only the interests of DBS providers who have continuously sought to evade the law. The proposal also gives DBS more than Congress ever intended. A much more desirable and effective resolution of the current situation can be achieved through "local-into-local" legislation. Belo respectfully urges the Commission to direct its resources toward providing support for this worthy Congressional effort.

Respectfully submitted,

A.H. Belo Corporation

Wiley, Rein & Fielding
1776 K Street, NW
Washington, D.C. 20006
(202) 429-7000
September 25, 1998

By:



James R. Bayes
Donna C. Gregg
Kenneth D. Katkin

Its Attorneys

Jules Cohen, P.E.
Consulting Engineer

**ENGINEERING STATEMENT
ON BEHALF OF A.H. BELO CORPORATION
IN REFERENCE TO PETITION OF
ECHOSTAR COMMUNICATIONS CORPORATION**

This engineering statement has been prepared on behalf of A.H. Belo Corporation in reference to the Petition for Declaratory Ruling and/or Rulemaking ("Petition") of EchoStar Communications Corporation. For the purpose of determining the eligibility of households to receive distant network television signals, as that eligibility is defined in the Satellite Home Viewer Act ("SHVA"), the Petition requests that the Commission develop a model specifically for prediction of service received at a household. In that model, the Petition requests that the prediction provide greater certainty than is possible through use of the Longley-Rice Irregular Terrain Model as employed by the Commission in matters relating to the adoption of digital television assignments.

As employed by the Commission, and generally by engineers seeking a more accurate representation of signal strength received than that afforded by the Commission's prediction method that takes into account terrain in only the first sixteen kilometers (ten miles) of the antenna, the Longley-Rice model is used with 50 percent location and time factors. Recognition must be given to the fact that those factors exist only at the outer bounds of whatever signal strength is under consideration. At locations closer to the transmitter, or at particularly favorable receiving locations, the location and time probabilities increase. As to confidence, location and time probability really incorporate the

Jules Cohen, P.E.
Consulting Engineer

Engineering Statement
Relative to EchoStar Petition

Page 2

confidence factor since the field strength predictions are based on empirical data as well as theoretical considerations.

To provide a measure of the impact of using what is believed to be an unrealistic approach to service predictions, Grade B field strength was predicted for three stations under Belo ownership using the Longley-Rice Model, Version 1.2.2 for 50 percent location and time probability and 99 percent¹ location and time probability. The stations studied were: KXTV, Sacramento, California; WFAA-TV, Dallas, Texas; and WVEC-TV, Hampton, Virginia. All three stations operate in the high VHF range with maximum effective radiated power of 316 kilowatts and respective antenna heights above average terrain of 595 meters, 512 meters, and 301 meters.

Maps depicting the two location and time probabilities for the three stations, as produced by a computer program, are included herein as Figures 1 through 6. The computer program was utilized also to determine households and populations predicted to receive Grade B or greater field strength. Tabulations of 1990 U.S. Census households and populations by counties, for the three stations, are included herein as Figures 7 through 9.

¹ Assuming, as the program does, that log normal distribution of the variables is applicable to the 99th percentile is not supported by signal strength data. Departures from log normal appear at the extremes so the log normal assumption should not be employed for probabilities of less than 10 percent or greater than 90 percent.

Jules Cohen, P.E.
Consulting Engineer

Engineering Statement
Relative to EchoStar Petition

Page 3

In addition to household and population counts, the area encompassed by Grade B signal zones were determined also by the same computer program. The areas are tabulated below. In the case of WVEC-TV, areas in the Atlantic Ocean and Chesapeake Bay were excluded from the quantities shown. Areas are in square kilometers.

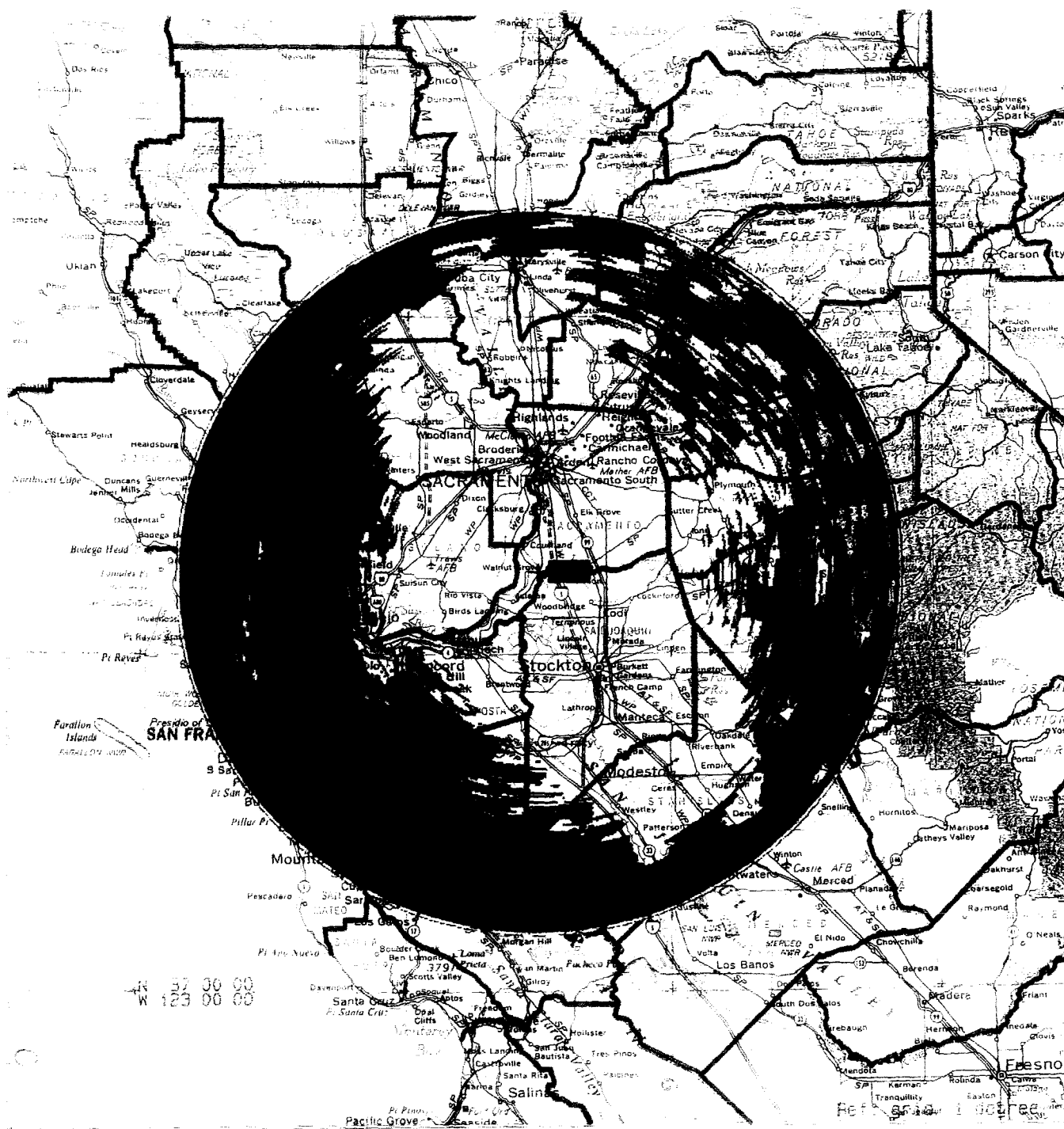
<u>Station</u>	<u>50-50 Location and Time</u>	<u>99-99 Location and Time</u>
KXTV	28,241	17,010
WFAA-TV	40,423	16,165
WVEC-TV	21,668	11,124

I declare under penalty of perjury that the foregoing is true and correct.

Executed on September 23, 1998.



Jules Cohen, P.E.



SIGNAL (tm) BELOECHO MAP

Propagation model: Longley Rice 5050
 Time: 50.00% Loc: 50.00% Margin: 1.0 dB
 Climate: Continental Temperate
 Gndcvt: None
 Atm factor: None
 K Factor: 1.333
 RX Antenna: Omni
 Height: 9.1 mtrs AGL Gain: 0 dBd

Field strength (at remote)

> 71.0 dBuV/m
 56.0 to 71.0 dBuV/m
 < 56.0 dBuV/m

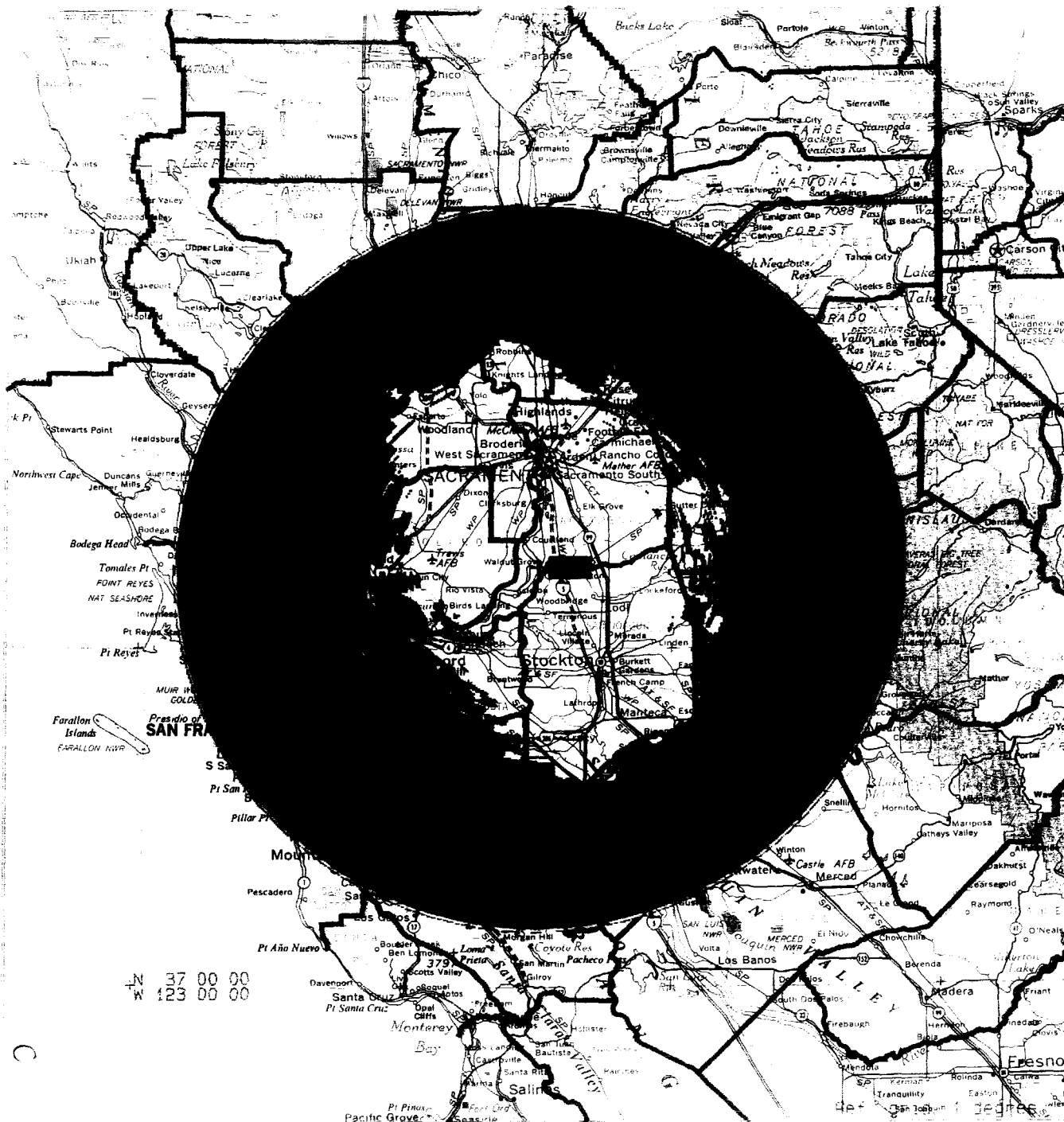
Minimum threshold level: -150.0 dBmW

Site	Ant. Elv AMSL (mtrs)	ERPd (dBW)	Ant. type /Orient.	Coordinates
KXTV *	597.0	55.00	DM-H	N 38 14 24.00
grp: 1	193.2500 MHz			W121 30 3.00

KILOMETERS
 50 0 50
 KXTV COVERAGE
 LONGLEY-RICE 5050

980918

Figure 1



SIGNAL (tm) .BELOECHO MAP

Propagation model: Longley-Rice v1.2.2
 Time: 99.00% Loc: 99.00% Margin: 0 dB
 Climate: Continental Temperate
 Gndcvr: None
 Atm. factor: None
 K Factor: 1.333
 RX Antenna: Omni
 Height: 9.1 mtrs AGL Gain: 0 dBd

Field strength (at remote)

> 71.0 dBuV/m
 56.0 to 71.0 dBuV/m
 < 56.0 dBuV/m

Minimum threshold level: -150.0 dBmW

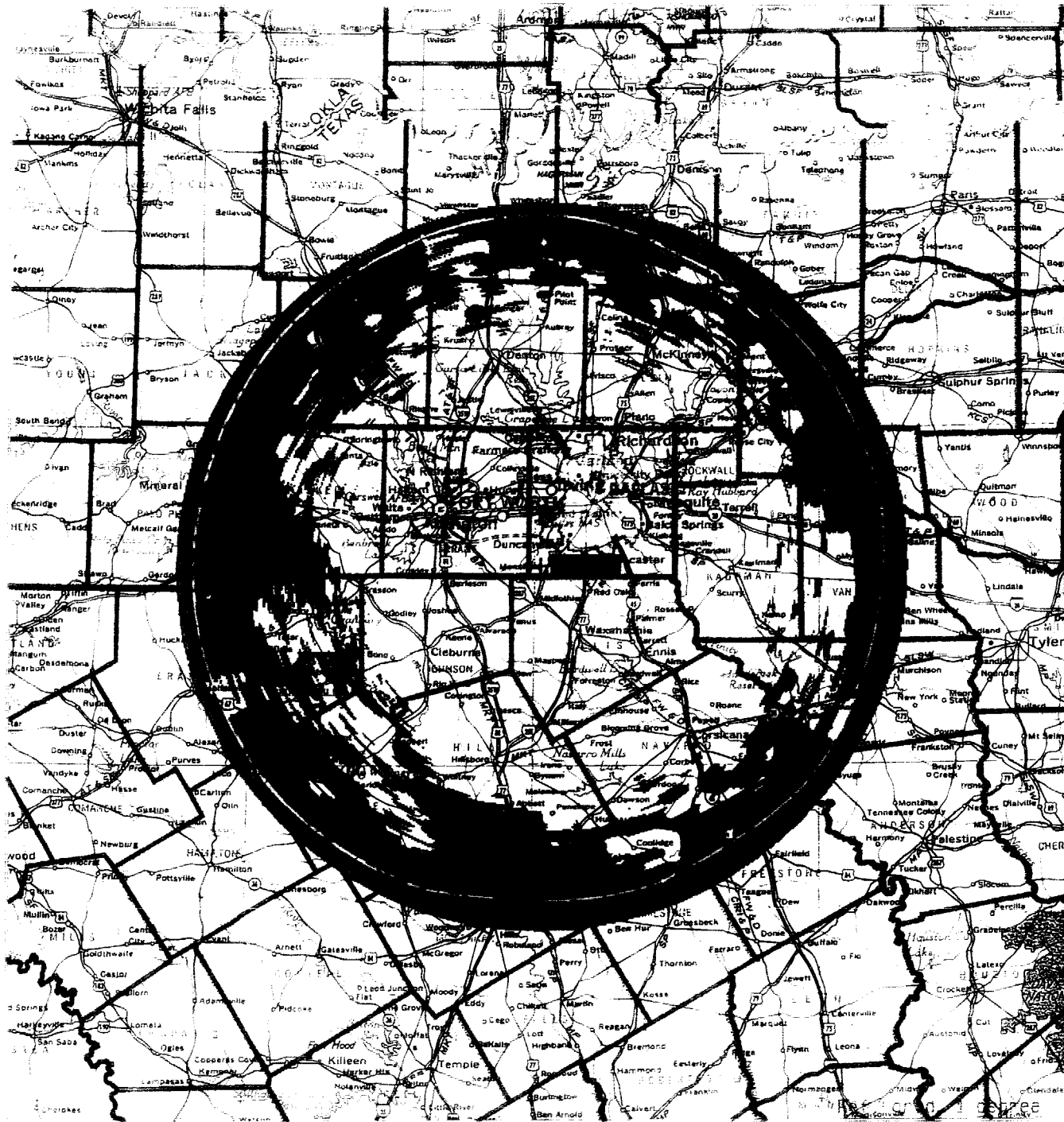
Site	Ant Elv AMSL (mtrs)	ERPd (dBW)	Ant. Type /Orient.	Coordinates
KXTV	* 597.0	55.00	OM-H	N 38 14 24 00
grp: 1	193.2500 MHz			W121 30 3 00



KXTV COVERAGE
 LONGLEY-RICE 9999

980918

Figure 2



SIGNAL (cm) : BELOECHO .MAP

Propagation model: Longley-Rice v1.2.2

Time: 50.00% Loc: 50.00% Margin: .0 dB

Climate: Continental temperate

Gndcvr: None

Atm. factor: None

K Factor: 1.333

RX Antenna: Omni

Height: 9.1 mtrs AGL Gain: .0 dBd

Field strength (at remote)

> 71.0 dBuV/m
56.0 to 71.0 dBuV/m
< 56.0 dBuV/m

Minimum threshold level: -150.0 dBmW

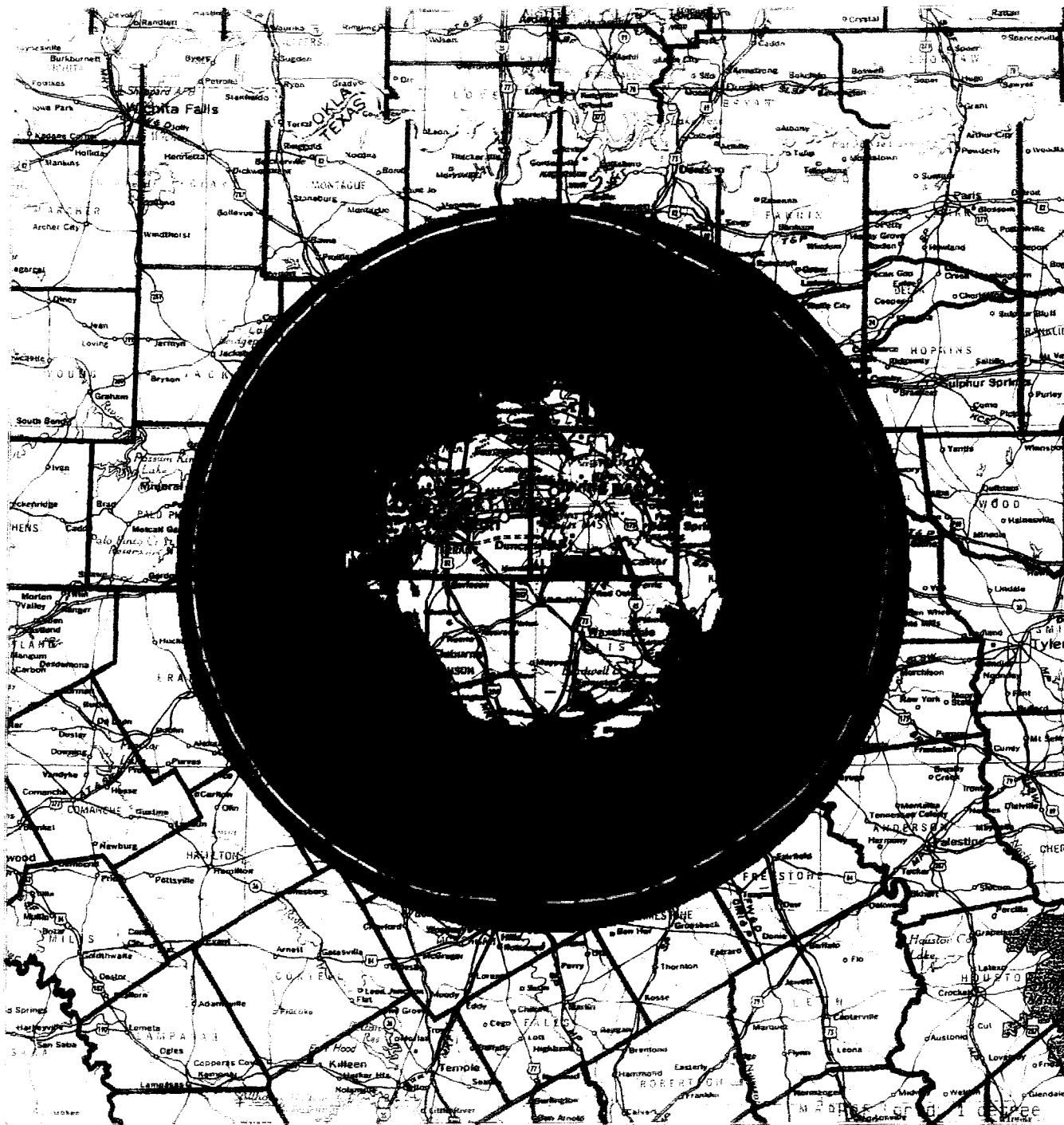
Site	Ant Eiv AMSL (mtrs)	ERPd (dBW)	Ant. Type /Orient	Coordinates
WFAA-TV *	704.1	55.00	OM-H	N 32 35 6.00
grp: 1	181.2500 MHz			W 96 58 41.00

KILOMETERS
50 0 50

WFAA-TV COVERAGE
LONGLEY-RICE 5050

980918

Figure 3



SIGNAL (tm): BELOECHO MAP

Propagation model: Longley-Rice v1.2.2
 Time: 99.00% Loc: 99.00% Margin: .0 dB
 Climate: Continental Temperate
 Gndcvt: None
 Atm. factor: None
 K Factor: 1.333
 RX Antenna: Omni
 Height: 9.1 mtrs AGL Gain: .0 dBd

Field strength (at remote)

> 71.0 dBuV/m
 56.0 to 71.0 dBuV/m
 < 56.0 dBuV/m

Minimum threshold level: 150.0 dBmW

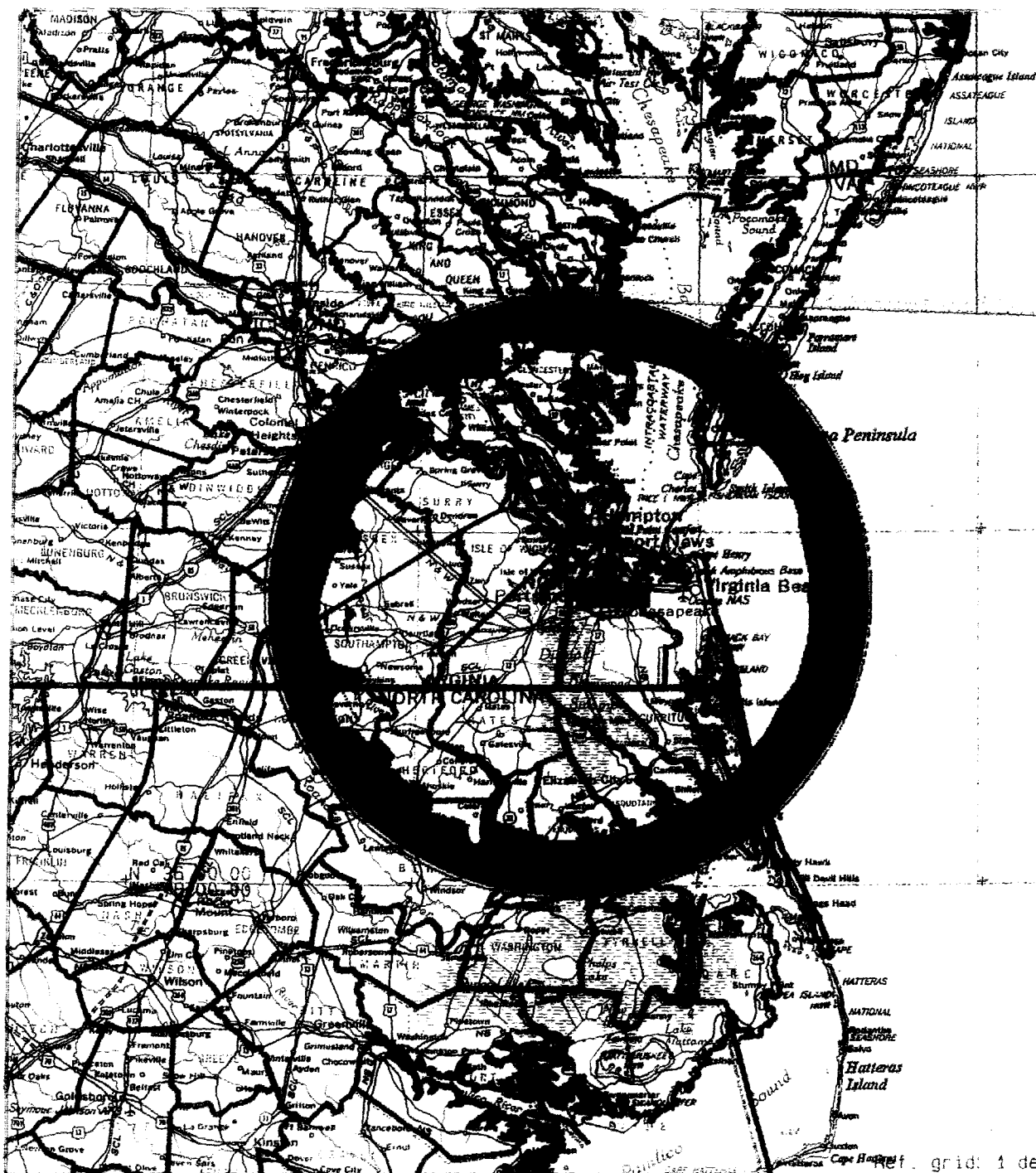
Site	Ant Elv AMSL (mtrs)	ERPd (dBW)	Ant. Type /Orient	Coordinates
WFAATV *	704.1	55.00	OM-H	N 32 35 6.00
grp: 1	181	2500 MHZ		W 96 58 41.00



WFAA-TV COVERAGE
 LONGLEY-RICE 9999

980918

Figure 4



SIGNAL (tm): BELOECHO MAP

Propagation model Longley-Rice v1.2.2
 Time: 50.00% Loc: 50.00% Margin: .0 dB
 Climate: Continental Temperate
 Gndcvt: None
 Atm. factor: None
 K Factor: 1.333
 RX Antenna: Omni
 Height: 9.1 mtrs AGL Gain: .0 dBd

Field strength (at remote)

> 71.0 dBuV/m
 56.0 to 71.0 dBuV/m
 < 56.0 dBuV/m

Minimum threshold level: -150.0 dBmW

Site	Ant Elv AMSL (mtrs)	ERPd (dBW)	Ant. Type /Orient.	Coordinates
WVECTV *	303.0	55.00	OM-H	N 36 49 .00
grp: 1	211.2400 MHz			W 76 28 5.00

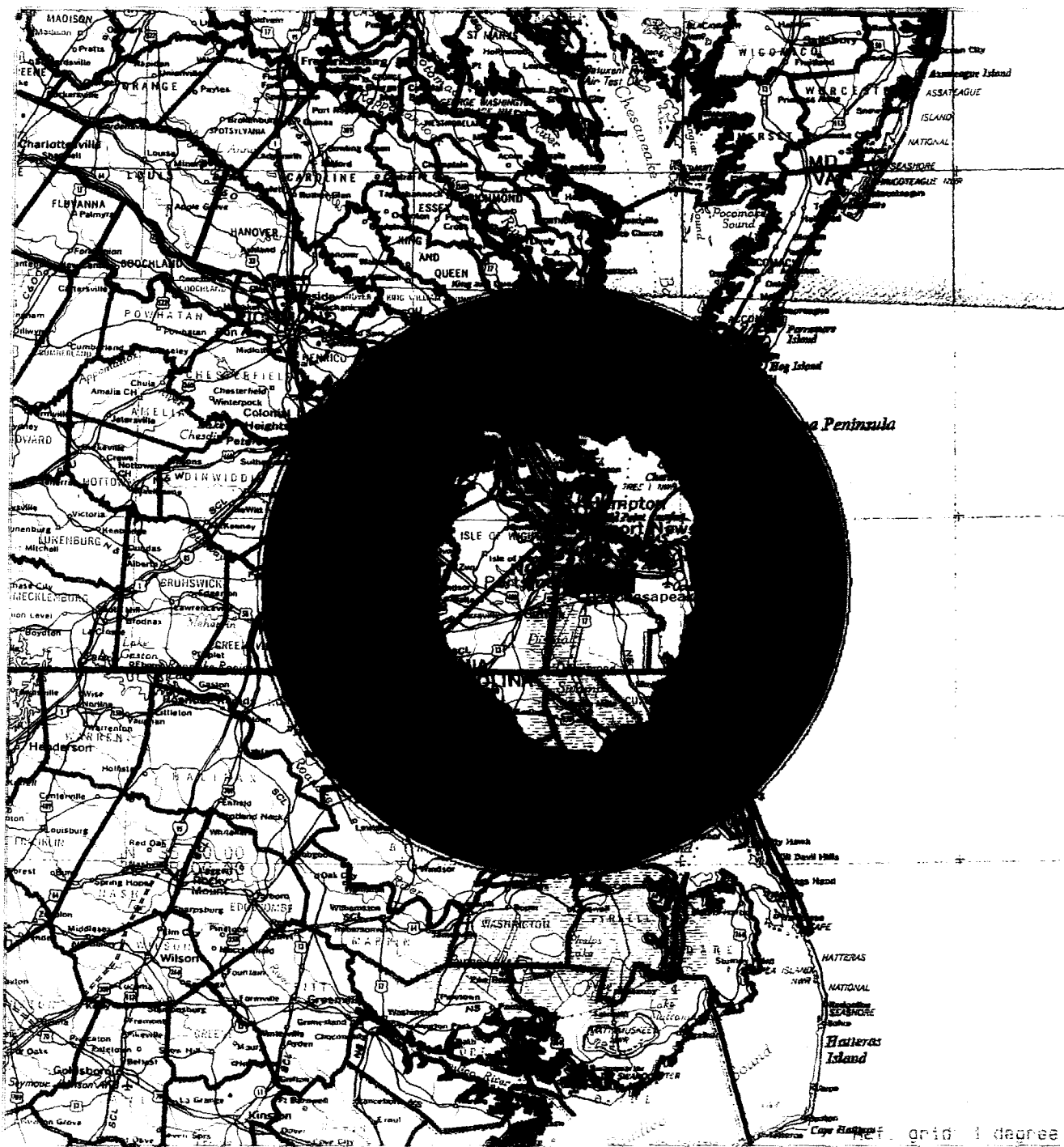
KILOMETERS
 50 0 50

WVEC-TV COVERAGE
 LONGLEY-RICE 5050

980918

Figure 5

grid: 1 degree



SIGNAL (tm): BELOECHO.MAP

Propagation model: Longley-Rice v1.2.2
 Time: 99.00% Loc: 99.00% Margin: 0 dB
 Climate: Continental Temperate
 Gndcvr: None
 Atm. factor: None
 K Factor: 1.333
 RX Antenna: Omni
 Height: 9.1 mtrs AGL Gain: 0 dBd

Field strength (at remote)

> 71.0 dBuV/m
 56.0 to 71.0 dBuV/m
 < 56.0 dBuV/m

Minimum threshold level: -150.0 dBmW

Site	Ant Elv (mtrs)	ERPd (dBW)	Ant. Type /Orient.	Coordinates
WVECTV *	303.0	55.00	OM-H	N 36 49 00
grp: 1	211.2400 MHz			W 76 28 5 00

KILOMETERS
 50 0 50

WVEC-TV COVERAGE
 LONGLEY-RICE 9999

980919

Figure 6

Figure 7

**COMPARISON OF LONGLEY-RICE STUDIES
KXTV, SACRAMENTO, CALIFORNIA**

County (California)	50% Location and Time		99% Location and Time	
	Households	Population	Households	Population
Alameda	43,603	116,282	350	861
Amador	10,463	26,303	6,120	17,263
Butte	24	48	0	0
Calaveras	10,350	19,963	3,417	7,878
Colusa	4,767	12,891	60	196
Contra Costa	224,800	570,646	79,889	213,976
El Dorado	32,984	81,549	13,604	34,094
Lake	16	36	0	0
Marin	54,294	130,562	1,124	2,551
Merced	9,500	30,985	0	0
Napa	18,209	45,909	115	226
Nevada	14,069	33,050	638	1,464
Placer	56,430	145,215	47,222	122,127
Sacramento	417,547	1,041,219	416,761	1,038,966
San Francisco	43,697	116,406	0	0
San Joaquin	166,160	480,497	166,155	480,484
San Mateo	30,711	81,071	0	0
Santa Clara	2,794	7,711	0	0
Solano	113,013	321,855	67,346	199,314
Sonoma	2,400	5,035	47	107
Stanislaus	131,785	370,006	92,598	260,730
Sutter	24,001	64,014	3,325	9,692
Tuolumne	5,888	16,167	737	1,062
Yolo	52,736	140,601	52,306	139,513
Yuba	16,531	44,913	1,737	4,567
Totals	1,486,772	3,902,934	953,551	2,535,159

**COMPARISON OF LONGLEY-RICE STUDIES
WFAA-TV, DALLAS, TEXAS**

County (Texas)	50% Location and Time		99% Location and Time	
	Households	Population	Households	Population
Anderson	128	273	0	0
Bosque	4,303	7,235	32	70
Collin	103,642	263,701	79,933	204,015
Cooke	7,938	18,678	0	0
Dallas	794,979	1,852,810	794,920	1,852,631
Denton	112,177	273,522	88,762	215,448
Ellis	31,274	85,167	31,274	85,167
Erath	1,015	2,200	0	0
Fannon	1,613	3,754	0	0
Freestone	1,920	3,917	0	0
Grayson	8,476	19,786	0	0
Hamilton	12	30	0	0
Henderson	21,511	38,637	1,227	2,518
Hill	12,838	27,146	3,323	7,780
Hood	14,797	28,882	80	177
Hopkins	68	122	0	0
Hunt	23,946	53,418	382	995
Jack	146	293	0	0
Johnson	37,005	97,165	36,694	96,450

Figure 8
Sheet 2 of 2

County (Texas)	50% Location and Time		99% Location and Time	
	Households	Population	Households	Population
Kaufman	20,054	52,220	17,077	44,777
Limestone	4,999	11,634	0	0
McClennan	43,944	101,888	0	0
Montague	166	301	0	0
Navarro	17,151	39,923	13,225	31,392
Palo Pinto	4,747	10,915	0	0
Parker	24,541	60,857	8,636	23,237
Rains	1,996	3,897	0	0
Rockwall	9,804	25,604	9,124	23,718
Somervell	2,349	5,225	0	0
Tarrant	490,560	1,170,103	487,698	1,163,379
Van Zandt	11,546	26,080	0	0
Wise	12,303	31,165	1,186	3,061
Totals	1,821,948	4,316,548	1,573,573	3,754,815

**COMPARISON OF LONGLEY-RICE STUDIES
WVEC-TV, HAMPTON, VIRGINIA**

County	50% Location and Time		99% Location and Time	
	Households	Population	Households	Population
<u>North Carolina</u>				
Bertie	4,248	10,400	0	0
Camden	2,277	5,548	2,152	5,299
Chowan	5,905	13,506	483	1,163
Currituck	6,807	13,060	3,850	9,456
Dare	101	272	0	0
Gates	3,693	9,305	3,673	9,264
Hertford	8,858	22,523	575	1,331
Northampton	4,419	10,419	0	0
Pasquotank	12,297	31,298	11,844	30,382
Perquimans	4,928	10,447	3,442	8,236
Tyrrell	115	191	0	0
Washington	75	119	0	0
<u>Virginia</u>				
Accomack	5	10	0	0
Charles City Co.	2,300	6,248	0	0
Chesterfield	1,052	2,749	0	0
Dinwiddie	826	2,099	0	0
Gloucester	12,418	30,131	7,890	18,844
Greensville	1,186	3,029	0	0
Henrico	17	48	0	0
Isle of Wight	9,717	24,986	9,717	24,986
James City Co.	14,324	34,859	10,690	25,564
King and Queen	1,158	2,593	0	0
Lancaster	2,454	4,073	0	0

Figure 9
Sheet 2 of 2

County (Virginia)	50% Location and Time		99% Location and Time	
	Households	Populations	Households	Populations
Mathews	4,659	8,348	3,851	7,318
Middlesex	4,608	7,295	214	322
New Kent	2,412	6,143	0	0
Northampton	5,175	10,519	2,435	5,071
Prince George	8,630	27,394	0	0
Southampton	6,545	17,550	4,043	10,317
Surry	2,973	6,145	2,285	5,087
Sussex	4,179	10,112	993	2,319
York	15,280	42,422	15,100	41,911
Independent Cities				
Chesapeake	55,740	151,976	55,740	151,976
Colonial Heights	2,370	6,198	0	0
Emporia	657	1,603	0	0
Franklin	3,166	7,864	3,166	7,864
Hampton	53,620	133,793	53,620	133,793
Hopewell	9,623	23,101	0	0
Newport News	69,694	170,045	69,694	170,045
Norfolk	98,725	261,229	98,725	261,229
Petersburg	14,513	34,579	0	0
Poquoson	3,890	11,005	3,890	11,005
Portsmouth	42,276	103,907	42,276	103,907
Suffolk	20,008	52,141	20,008	52,141
Virginia Beach	146,964	393,018	146,964	393,018
Williamsburg	3,959	11,530	3,564	10,717
Totals	681,186	1,739,908	580,884	1,502,565